



Battle of the Neighborhoods: Spice Route into the Big Apple

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Introduction

The client, an importer of essential Chinese cuisine ingredients is looking to expand into the United States of America, primarily setting up shop in New York. The company wants insights into neighborhoods and Chinese restaurants in the city so that it can develop a territorial strategy on considerations such as the size of the Chinese cuisine market in New York and the number of prime restaurants in the 5 boroughs (Manhattan, Queens, Brooklyn, The Bronx, Staten Island).

In knowing how many Chinese restaurants are in each borough, our client will be able to identify the best to focus area to meet a large demand. Additionally, it would also like to identify restaurants with the highest ratings, as this in turn could be used for them to strategise sales and marketing growth through having a high-profile line of buyers.

This project will explore the location data of New York City and how we can help our client (the fintech company) develop their strategy based on the insights we have obtained.

Data

For this project we need the following data:

1. Restaurants data that contains list Locality, Restaurant name, Rating along with their latitude and longitude in New York City.
 - Foursquare API to obtain venues & details.
 - scraping from https://cocl.us/new_york_dataset to obtain New York City data set.
2. Nearby places in each locality of New York City. By using API's, we will get all the venues (Chinese restaurants) in each neighborhood.
 - Foursquare API to obtain number of restaurants & ratings

Methodology

1. Collect data from the NYC Public Dataset to obtain the area with the most neighborhoods among the 5 boroughs of New York City, the shape of our dataset, and coordinates with Foursquare API.
2. Using the Foursquare API to find Chinese restaurants for each neighborhood and identify the ones with the best ratings using the following libraries:
 - pandas (data framing)
 - NumPy/ SciPy (mathematical calculations)
 - matplotlib (data visualization & plotting)
 - Folium (geospatial visualization).

Findings & Discussions

Which of the 5 boroughs has the most neighborhoods?

Borough	No. of Neighborhoods
Queens	80
Brooklyn	70
Staten Island	66
The Bronx	50
Manhattan	40
TOTAL	306

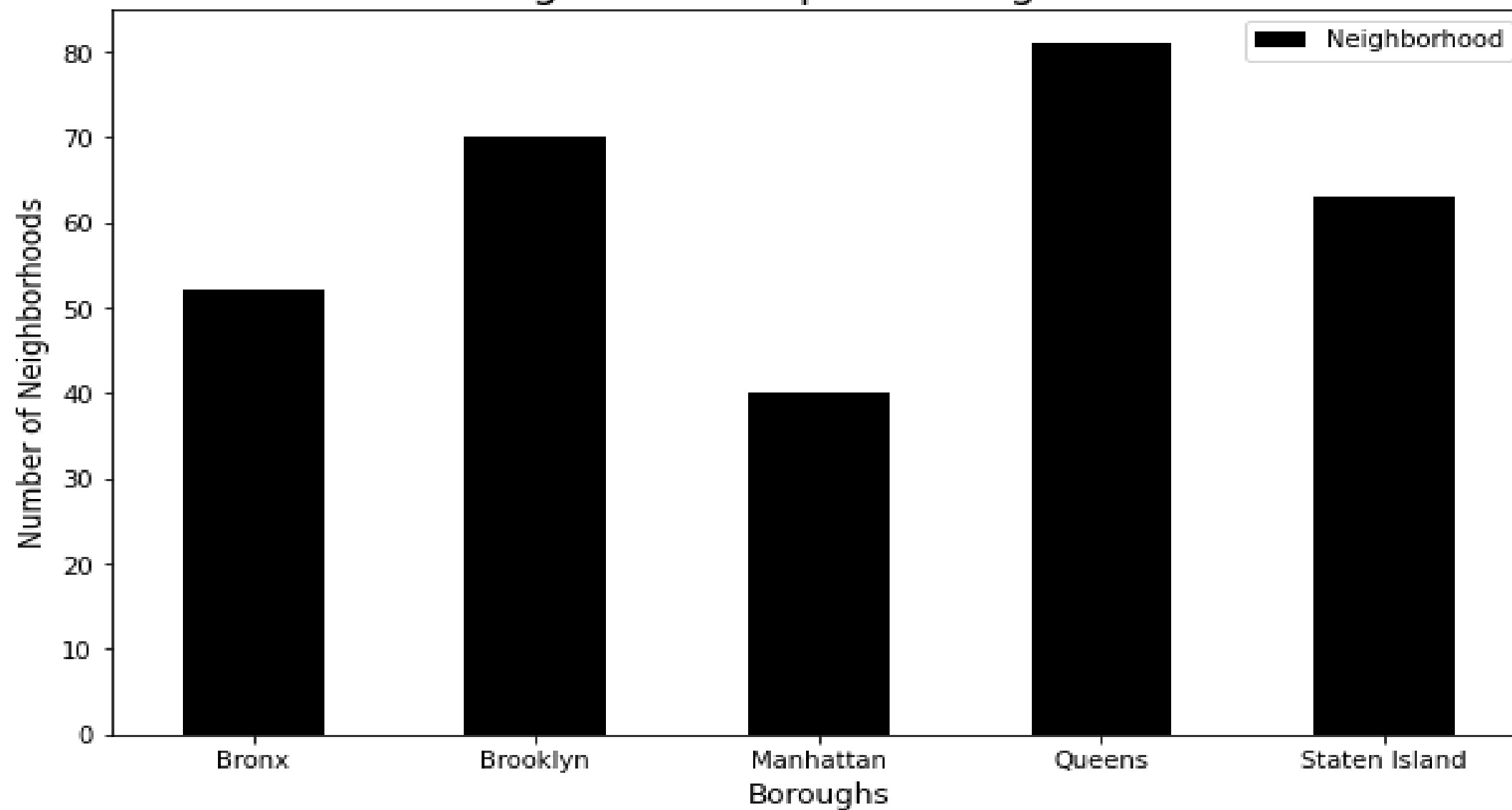
Queens has the most neighborhoods (80), followed by Brooklyn (70), Staten Island (66), The Bronx (50) and Manhattan (40).

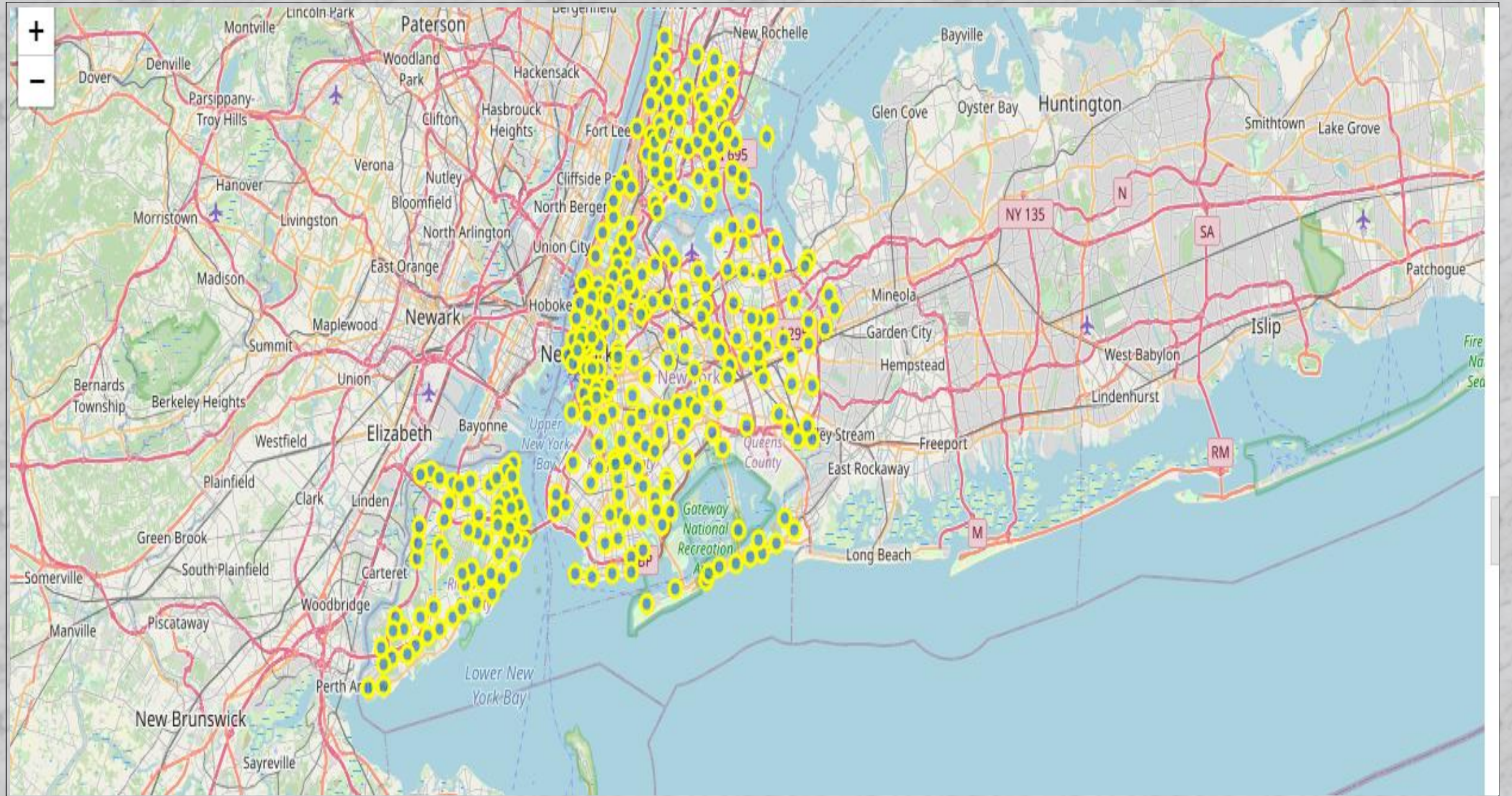
Queens, New York City



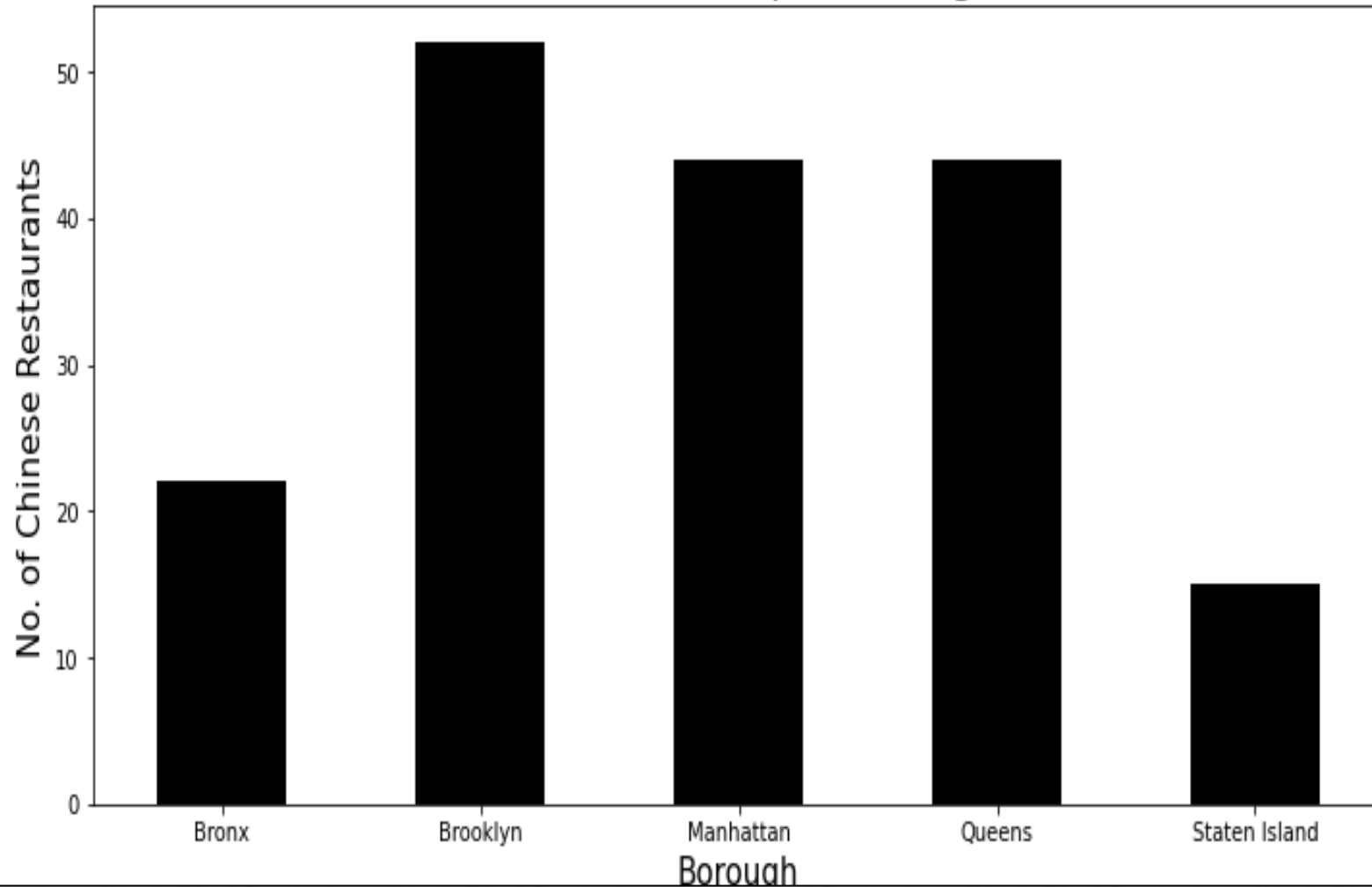


Neighborhoods per Borough: NYC





Chinese Restaurants per Borough: NYC



What is the number of Chinese restaurants in New York City?

1. **Brooklyn (50)**
2. Manhattan (45)
3. Queens (45)
4. The Bronx (20)
5. Staten Island (17)

There are a total of **177 Chinese restaurants** across the 5 boroughs.

Which boroughs have the most Chinese restaurants?

By boroughs	
Borough	Chinese restaurants
Brooklyn	50
Manhattan	45
Queens	45
The Bronx	20
Staten Island	17
TOTAL	177

Brooklyn has the most Chinese restaurants (50), followed by Manhattan (45) and Queens (45), The Bronx (20) and Staten Island (17).

A typical Chinese meal set



Which neighborhoods have the most Chinese restaurants?

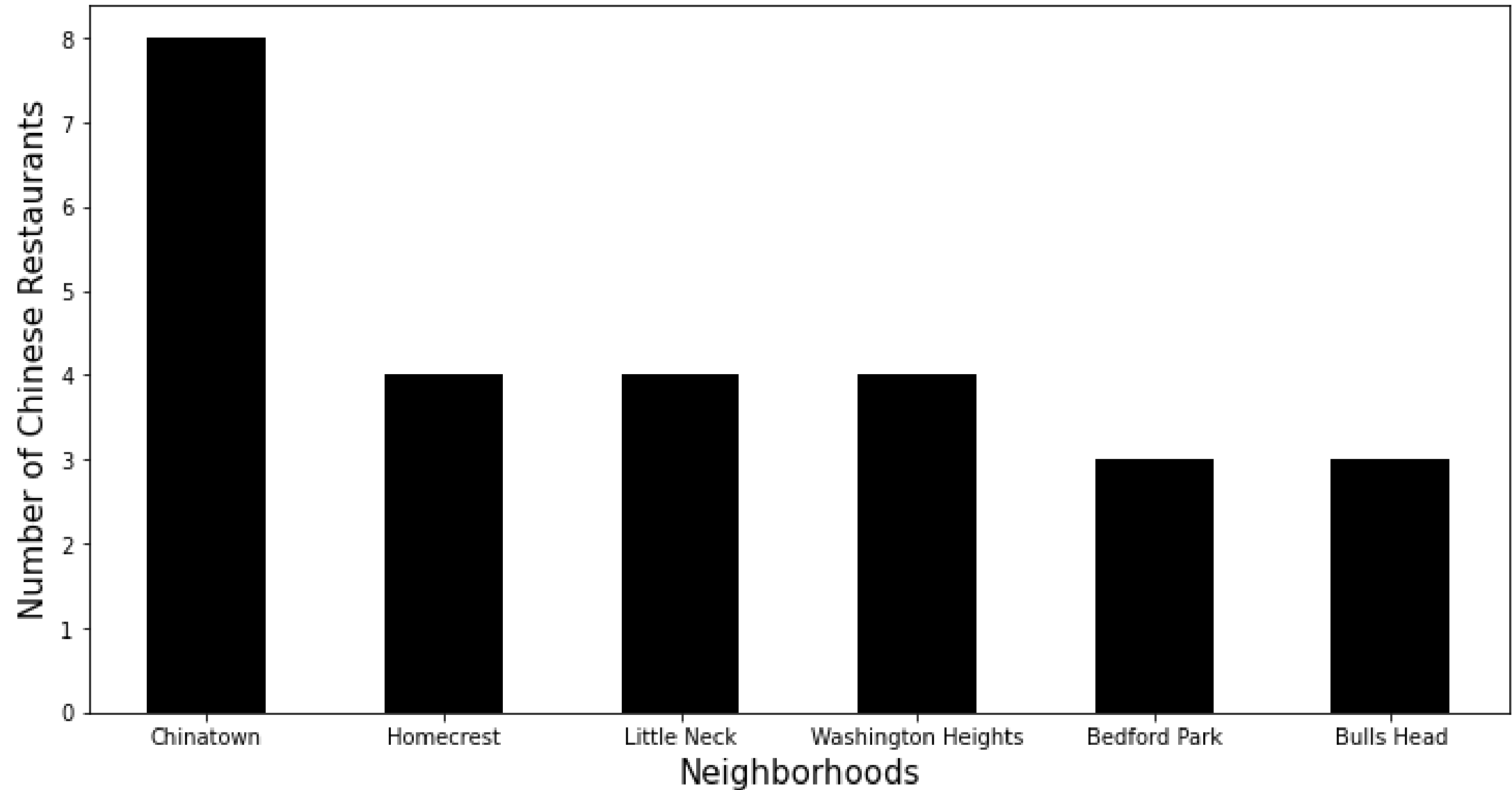
By neighborhoods (Top 6)	
Neighborhoods	Chinese restaurants
Chinatown, Manhattan	8
Washington Heights, Manhattan	4
Little Neck, Queens	4
Homecrest, Brooklyn	4
Bedford Park, The Bronx	3
Bulls Head, Staten Island	3

Manhattan has the most Chinese restaurants (8 in Chinatown and 4 in Washington Heights), followed by Homecrest in Brooklyn (4), Little Neck in Queens (4), Bedford Park in The Bronx (3), and Bulls Head in Staten Island (3)

Chinatown, Manhattan



Top 6 Neighbourhoods with most Chinese Restaurants



Which Chinese restaurants are the best in NYC?

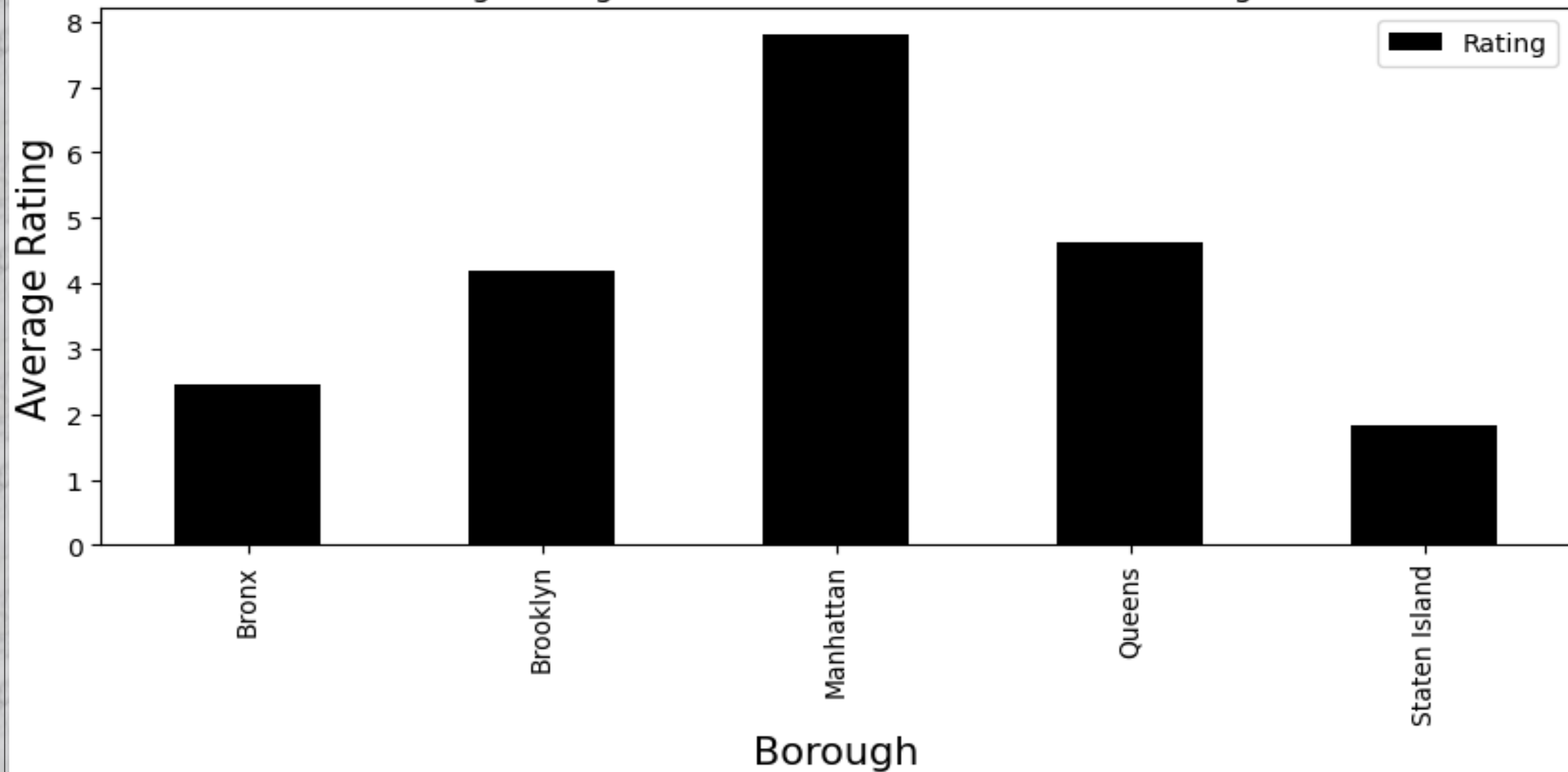
	NAME	NEIGHBORHOOD	BOROUGH	LIKES	RATING	TIPS
MOST LIKES	Buddakan	Chelsea	Manhattan	1483	9.0	521
HIGHEST RATING	Xi'an Famous Foods	Flatiron	Manhattan	212	9.1	43
MOST TIPS	Buddakan	Chelsea	Manhattan	1483	9.0	521

Top 10 Highly Rated Chinese Restaurants in the 5 boroughs (Manhattan, Queens, Brooklyn, The Bronx, Staten Island)

No	NAME	NEIGHBORHOOD	BOROUGH	LIKES	RATING	TIPS
1	Xi'an Famous Foods	Flatiron	Manhattan	212.0	9.1	43.0
2	Buddakan	Chelsea	Manhattan	1483.0	9.0	521.0
3	Kings County Imperial	Lower East Side	Manhattan	77.0	9.0	10.0
4	Xi'an Famous Foods	Chinatown	Manhattan	105.0	9.0	29.0
5	Birds of a Feather	North Side	Brooklyn	352.0	9.0	75.0
6	East Wind Snack Shop	Windsor Terrace	Brooklyn	142.0	8.9	51.0
7	Café China	Murray Hill	Manhattan	1046.0	8.9	273.0
8	Málà Project	East Village	Manhattan	439.0	8.9	91.0
9	Decoy	West Village	Manhattan	336.0	8.9	105.0
10	Han Dynasty	Upper West Side	Manhattan	322.0	8.8	66.0

8 of the top 10 highly rated Chinese restaurants are in various neighborhoods across Manhattan

Average rating of Chinese Restaurants in NYC 5 Boroughs





Folium view of restaurants with highest ratings across the 5 boroughs

Where should our client set up shop among New York's five boroughs (Manhattan, Queens, Brooklyn, The Bronx, Staten Island)?

Primary Location: Manhattan



- 2nd Largest market size of Chinese restaurants (45).
- Most Chinese restaurants (8 in Chinatown and 4 in Washington Heights) by neighborhoods.
- 8/10 highly rated Chinese restaurants in Manhattan neighborhoods.
- **Satisfies the need to consolidate both a large and high-profile customer base.**

Secondary Location: Brooklyn



- Largest market size of Chinese restaurants in (50).
- 2 /10 highly rated Chinese restaurants in Brooklyn neighborhoods.
- 2nd largest number of neighborhoods.
- **This can accommodate to end-user consumption such as non-enterprise customers**

Conclusion

We can say that our client has the potential to expand strategically if it were to consider penetrating the New York City market of Chinese restaurants through **Manhattan and/or Brooklyn**. This much is owed to the large number of high-profile Chinese restaurants in Manhattan and a substantial middle-to-low end market in both Manhattan and Brooklyn.

Distribution of goods can be given high priority in both areas as within Manhattan, the client can focus on partnerships and expanding across highly rated Chinese restaurants. Meanwhile, Brooklyn as a destination can be owed to the large size of Chinese restaurants and neighborhood distributions. This can serve to benefit the client through retail sales of goods to everyday consumers, apart from their primary target market which is Chinese restaurants.

END